

COMMONWEALTH of VIRGINIA

DEPARTMENT OF ENVIRONMENTAL QUALITY PIEDMONT REGIONAL OFFICE 4949-A Cox Road, Glen Allen, Virginia 23060

Douglas W. Domenech Secretary of Natural Resources 4949-A Cox Road, Glen Allen, Virginia 23060 (804) 527-5020 Fax (804) 527-5106 www.deq.virginia.gov

David K. Paylor
- Director

March 24, 2010

Mr. David N. Smith Director of Environmental, Health and Safety Services Old Dominion Electric Cooperative Innsbrook Corporate Center 4201 Dominion Boulevard Glen Allen, Virginia 23060

Location: Surry County Registration No.: 52272

Dear Mr. Smith:

This letter acknowledges receipt of supplemental information, dated February 26, 2010, to Old Dominion Electric Cooperative's (ODEC) Cypress Creek Power Station PSD permit application. The original PSD permit application was dated December 17, 2008, and the case-by-case MACT analysis was dated February 10, 2009. The staff of the Piedmont Regional Office has completed a preliminary review of your revised application, and the following deficiencies or comments have been identified.

The response you provided on February 26, 2010 included two, signed Local Governing Body Certification Forms (LGBCF): one (dated February 9, 2010) from the incorporated town of Dendron, Virginia and one (dated February 16, 2010) from the County of Surry, Virginia. Both localities certified that the proposed facility is fully consistent with all applicable local ordinances. The DEQ can now continue processing ODEC's PSD application for the Dendron/Surry site. Please be advised that any consideration of an alternative site location other than the Dendron/Surry site would constitute a separate application/evaluation process and necessitate submittal of entirely new and separate application documentation.

In the February 11, 2010 Federal Register, the US EPA proposed a rule change for 40 CFR Part 52 that would end the 1997 policy regarding demonstration of compliance with PM₁₀ PSD standards as a surrogate for meeting PM_{2.5} PSD standards. In anticipation of this rule change, in the May 18, 2009 information request letter, DEQ requested a top-down BACT analysis for PM_{2.5}. Your February 26, 2010 response to this item refers to a "revised particulate BACT analysis." Preliminary review of the revised particulate BACT analysis indicates that ODEC has not provided the required top-down BACT analysis for PM_{2.5}. Instead, the revised analysis states "... The Applicant doesn't believe separate limits for PM_{2.5} are appropriate ..." The provided analysis is inadequate for top-down PM_{2.5} BACT purposes. Since a top-down BACT analysis for PM_{2.5} is required for this application, DEQ reiterates our request for ODEC to provide the analysis. For informational purposes, you may want to consider the PM_{2.5} BACT analyses from the Montana Highwood and Michigan Wolverine projects, when developing the analysis for Cypress Creek.

The DEQ is in the process of reviewing the regulated pollutant emission rates specified in your application and comparing them to other permitted rates for facilities throughout the country. During this preliminary review, we found limits for some pollutants from the Karn-Weadock, Desert Rock, and John W. Turk facilities that were lower than emission rates provided in your application. We request that you consider and evaluate these facilities in your application's compilation of affected facilities and update your application and BACT analysis accordingly.

Your February 2010 BACT submittal did not include a BACT analysis for the biomass dryers. Our review indicates the level of particulate matter control provided by the dryers' cyclone/venturi scrubber system may not be consistent with BACT, which would be an emission rate commensurate with fabric filtration control. We request that you provide a top-down BACT analysis for particulate matter control from the biomass dryers. Also, our preliminary review indicates no analysis of volatile organic compound or toxic air pollutant emissions from the dryers was included in your application. We request that the application be updated to include such evaluation and that a top-down volatile organic compound BACT analysis be provided, as necessary. Consideration of the toxic air pollutant emissions should also be made, which may include updating the MACT portions of the application.

As our evaluation of your application continues, we anticipate providing additional comments and requesting additional information, including at an appropriate future time a requirement that comprehensive and up-to-date Form 7, BACT, and MACT submittals be provided, so that all application changes will be accurately represented in single collection of coordinated documents.

Finally, DEQ has augmented this project's PSD permit team with a permitting manager who has recent experience related to this source category. Rob Feagins, Air Permit Manager in DEQ's Southwest Regional Office will provide coordination for the PSD permit project. While the Piedmont Regional Office will remain the Office of Record, you should copy Rob in the Southwest Regional Office on all future correspondence related to this application.

Mr. Rob Feagins
Air Permit Manager
Department of Environmental Quality
Southwest Regional Office
P.O. Box 1688
Abingdon, Virginia 24212

If you have any additional questions, you can call Rob at 276-676-4835, or email him at rob.feagins@deq.virginia.gov.

Sincerely,

James E. Kyle, P.E. Air Permit Manager

JEK/smf/52272 Deficiency Letter 03242010.DOC

cc: NPS, Shenandoah National Park
USFS, James River Face Wilderness Area
USFS, Swanquarter Wilderness Area
USFS, Dolly Sods Wilderness Area
USFS, Otter Creek Wilderness Area
US EPA, Regional Administrator, Region III